

Table 20: Clinical evidence profile: Comparison 14. Non-invasive ventilation (NIV) versus no airway clearance technique

Quality assessment							No of patients		Effect		Quality	Importance
No of studies	Design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	NIV	No airway clearance technique	Relative (95% CI)	Absolute		
Lung function - FEV₁ (follow-up 6 weeks; measured with: % predicted; range of scores: 0-100; Better indicated by higher values)												
1 (Young 2008)	randomised trials	no serious risk of bias	no serious inconsistency	no serious indirectness	very serious ¹	none	7	8	-	MD 1 higher (8.62 lower to 10.62 higher)	LOW	IMPORTANT
Lung function - FVC (follow-up 6 weeks; measured with: % predicted; range of scores: 0-100; Better indicated by higher values)												
1 (Young 2008)	randomised trials	no serious risk of bias	no serious inconsistency	no serious indirectness	very serious ²	none	7	8	-	MD 4 higher (10.3 lower to 18.3 higher)	LOW	IMPORTANT
Oxygen saturation (nocturnal) (follow-up 6 weeks; measured with: %; range of scores: 0-100; Better indicated by higher values)												
1 (Young 2008)	randomised trials	no serious risk of bias	no serious inconsistency	no serious indirectness	serious ³	none	7	8	-	MD 3 higher (1.12 lower to 7.12 higher)	MODERATE	IMPORTANT
Quality of life – CF-QOL chest symptom score (follow-up 6 weeks; range of scores: 0-100; Better indicated by higher values)												
1 (Young 2008)	randomised trials	no serious risk of bias	no serious inconsistency	no serious indirectness	very serious ^{1,4}	none	7	8	-	MD 7 higher (11.73 lower to	LOW	IMPORTANT

Quality assessment							No of patients		Effect		Quality	Importance
No of studies	Design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	NIV	No airway clearance technique	Relative (95% CI)	Absolute		
										25.73 higher)		
Quality of life - CF-QOL traditional dyspnoea index score (follow-up 6 weeks; range of scores: 0-100; Better indicated by higher values)												
1 (Young 2008)	randomised trials	no serious risk of bias	no serious inconsistency	no serious indirectness	serious ^{4,5}	none	7	8	-	MD 2.9 higher (0.71 to 5.09 higher)	MODERATE	IMPORTANT

Abbreviations: CI: confidence interval; FEV₁: forced expiratory volume in 1 second; FVC: forced vital capacity; MD: mean difference; NIV: non-invasive ventilation

1 The quality of the evidence was downgraded by 2 due to very serious imprecision as 95% CI crossed 2 clinical MIDs

2 The quality of the evidence was downgraded by 2 due to very serious imprecision as 95% CI crossed 2 default MIDs

3 The quality of the evidence was downgraded by 1 due to serious imprecision as 95% CI crossed 1 default MID

4 Clinical MID=5 was used to assess imprecision for quality of life because the CF QOL questionnaire (Gee et al. 2000) was used

5 The quality of the evidence was downgraded by 1 due to serious imprecision as 95% CI crossed 1 clinical MID